

CALIFORNIA REGIONAL WATER QUALITY CONTROL BOARD
SAN FRANCISCO BAY REGION

ORDER NO. 78-38

WASTE DISCHARGE REQUIREMENTS FOR:

SONOMA CREEK CELLARS
SCHELLVILLE, SONOMA COUNTY

The California Regional Water Quality Control Board, San Francisco Bay Region (hereinafter Board), finds that:

1. Sonoma Creek Cellars submitted a report of waste discharge on March 28, 1978.
2. Sonoma Creek Cellars (hereinafter discharger) discharges the following wastes:
 - a. Waste No. 1 consists of sanitary sewage with a maximum flow of 470 gallons per day (gpd) from 4 employees and 100 visitors. On non-visitor days Waste No. 1 will be 120 gpd. The waste is discharged into a septic tank and a sand-mound soil-absorption system having an area of 2000 square feet.
 - b. Waste No. 2 consists of industrial waste, only, from the production of wine including crushing, bottling, and clean-up operations. The estimated flow is 1000 gpd average and 4500 gpd maximum during grape-crushing season (August 15 to November 1) based on a 163 ton annual crush. Winery wastes will be screened, neutralized with ammonia, biologically oxidized by an aeration pond of 50,000 gallons capacity, and stored along with well water in a 30 million gallon reservoir used for irrigation of 170 acres of vineyard. All process waste will be contained on the discharger's property.
3. The Board adopted a Water Quality Control Plan for the San Francisco Bay Basin in April, 1975.
4. The beneficial uses of the lower Sonoma Valley ground waters as set forth in the Basin Plan include:

Domestic water supply
Agricultural water supply
5. The beneficial uses of Sonoma Creek as set forth in the Basin Plan include:

Domestic water supply
Recreation, including body contact sports
Migratory routes for spawning of steelhead and trout fishes
Agricultural water supply for stock watering and irrigation
Esthetic enjoyment

6. The County of Sonoma found and determined on the basis of an Initial Study that the project, as described, will have no substantial adverse effect on the environment, and therefore adopted a Negative Declaration regarding this project dated August 1, 1977, in accordance with the California Environmental Quality Act (Public Resources Code Section 2100 et. seq.).
7. The Board has notified the discharger and interested agencies and persons of its intent to prescribe waste discharge requirements for the discharge and has provided them with an opportunity for a public hearing and an opportunity to submit their written views and recommendations.
8. The Board, in a public meeting, heard and considered all comments pertaining to the discharge.

IT IS HEREBY ORDERED that Sonoma Creek Cellars, in order to meet the provisions contained in Division 7 of the California Water Code and regulations adopted thereunder, shall comply with the following:

A. Discharge Specification

1. The treatment or disposal of waste shall not create a nuisance as defined in Section 13050(m) of the California Water Code.
2. Waste 1 shall be kept below the ground surface at all times.
3. The disposal of Wastes 1 or 2 shall not cause degradation of ground water suitable for domestic use or cause an increase in any quality parameter that would make ground water unsuitable for irrigation use.
4. Waste 2 as contained in the aeration pond and final settling pond shall meet the following limits at all times:

Dissolved Oxygen	1.0 mg/l minimum
Dissolved Sulfide	0.1 mg/l maximum

Waste 2 as contained in the final settling pond shall meet the following limits at all times:

pH	6.0 minimum
	9.0 maximum

5. The aeration and settling ponds for Waste 2 shall be protected from erosion, washout or flooding having a predicted frequency of once in 100 years. A minimum of two feet of freeboard shall be maintained in the ponds.

6. Vertical and lateral hydraulic continuity of Waste 2 with groundwaters shall be prevented by the presence of a natural clay barrier of at least three (3) feet in thickness and a permeability of 10^{-6} cm/sec or less on the bottom and sides of the aeration pond. If such a natural condition does not exist, an artificial barrier shall be constructed to meet the above specifications. Existence and continuity of such barrier must be demonstrated to the satisfaction of this Board's Executive Officer prior to discharging waste material. Reports submitted in compliance with this requirement shall be signed by a registered engineer or certified engineering geologist in the State of California.

B. Prohibitions

1. Neither Waste 1 or 2 shall be allowed to escape from the discharger's property into waters of the State via surface flow, surfacing after percolation, or airborne spray.
2. Waste 1 shall not exceed 470 gallons per day.
3. Waste 1 shall not be discharged into the aeration pond.

C. Provisions

1. All necessary waste handling facilities shall be constructed and operable before the discharge of Waste 1 and Waste 2 commences.
2. The discharger shall file with the Regional Board technical reports on self-monitoring work performed according to detailed specifications as directed by the Executive Officer.
3. The discharger shall file with the Regional Board a report of waste discharge at least 120 days before making any material change or proposed change in the character, location or volume of the discharge.
4. The discharger shall comply with the following items contained in the attached Regional Board's "Standard Provisions, Reporting Requirements, and Definitions", dated April 1977: A.2., A.3., A.4., A.6., A.7., A.8., A.11., A.14., A.15., and C.5.
5. This Board will review this Order periodically and may revise the requirements when necessary.

I, Fred H. Dierker, Executive Officer, do hereby certify the foregoing is a full, true, and correct copy of an order adopted by the California Regional Water Quality Control Board, San Francisco Bay Region, on June 20, 1978.

FRED H. DIERKER
Executive Officer

Attachments:

Standard Provisions, Reporting Requirements and Definitions, April 1977
Self-Monitoring Program

CALIFORNIA REGIONAL WATER QUALITY CONTROL BOARD
SAN FRANCISCO BAY REGION
APRIL 1977

STANDARD PROVISIONS, REPORTING REQUIREMENTS AND DEFINITIONS

A. Standard Provisions:

1. Neither the treatment nor the discharge of wastes shall create a nuisance or pollution as defined in the California Water Code.
2. The requirements prescribed herein do not authorize the commission of any act causing injury to the property of another, nor protect the discharger from his liabilities under federal, state, or local laws, nor guarantee the discharger a capacity right in the receiving waters.
3. The discharger shall permit the Regional Board and the Environmental Protection Agency:
 - (a) Entry upon premises in which an effluent source is located or in which any required records are kept;
 - (b) Access to copy any records required to be kept under terms and conditions of this Order;
 - (c) Inspection of monitoring equipment or records, and
 - (d) Sampling of any discharge.
4. All dischargers authorized by this Order shall be consistent with the terms and conditions of this Order. The discharge of any pollutant more frequently than or at a level in excess of that identified and authorized by this Order shall constitute a violation of the terms and conditions of this Order.
5. The discharger's wastewater treatment plant shall be supervised and operated by persons possessing certificates of appropriate grade pursuant to Chapter 3, Subchapter 14, Title 23, California Administrative Code.
6. The discharger shall maintain in good working order and operate as efficiently as possible any facility or control system installed by the discharger to achieve compliance with the waste discharge requirements.
7. Collected screenings, sludges, and other solids removed from liquid wastes shall be disposed of at a legal point of disposal, and in accordance with the provisions of Division 7.5 of the California Water Code. For the purpose of this requirement, a legal point of disposal is defined as one for which waste discharge requirements have been prescribed by a regional water quality control Board and which is in full compliance therewith.

- b) Should the Regional Board not approve the existing safeguards, the discharger shall, within ninety (90) days of having been advised by the Regional Board that the existing safeguards are inadequate, provide to the Regional Board and the Regional Administrator a schedule of compliance for providing safeguards such that in the event of reduction, loss, or failure of electric power, the permittee shall comply with the terms and conditions of this permit. The schedule of compliance shall, upon approval of the Regional Board Executive Officer, become a condition of this Order.
13. Any diversion from or bypass of facilities necessary to maintain compliance with the terms and conditions of this Order is prohibited, except (a) where unavoidable to prevent loss of life or severe property damage, or (b) where excessive storm drainage or runoff would damage any facilities necessary for compliance. Wet weather diversions and bypasses may be subject to waste discharge requirements.
- The discharger shall take all reasonable steps to minimize any adverse impact to receiving waters resulting from noncompliance with any effluent limitations or prohibition specified in this Order, including such accelerated or additional monitoring as necessary to determine the nature and impact of the noncomplying discharge.
- Details of notification procedures, required written reports and accelerated monitoring are contained in the Self-Monitoring Program.
14. Except for data determined to be confidential under Section 308 of the Federal Water Pollution Control Act, all reports prepared in accordance with terms of this Order shall be available for public inspection at the offices of the Regional Water Quality Control Board, and the Regional Administrator of EPA. As required by the Federal Water Pollution Control Act, effluent data shall not be considered confidential. Knowingly making any false statements on any such report may result in the imposition of criminal penalties as provided for in Section 309 of the Act.
15. In the event of any change in control or ownership of land or waste discharge facilities presently owned or controlled by the discharger, the discharger shall notify the succeeding owner or operator of the existence of this Order by letter, a copy of which shall be forwarded to this Board.
16. The discharger shall ensure compliance with any existing or future pretreatment standard promulgated by EPA under Sections 307 of the Federal Water Pollution Control Act or amendment thereto, for any discharge to the municipal system.
17. The discharge of any radiological, chemical, or biological warfare agent or high level radiological waste is prohibited.

5. The discharger shall file a written report with the Board within ninety (90) days after the average dry-weather waste flow for any month equals or exceeds 75 percent of the design capacity of his waste treatment and/or disposal facilities. The discharger's senior administrative officer shall sign a letter which transmits that report and certifies that the policy-making body is adequately informed about it. The report shall include:

- a. Average daily flow for the month, the date on which the instantaneous peak flow occurred, the rate of that peak flow, and the total flow for the day.
- b. The discharger's best estimate of when the average daily dry-weather flow rate will equal or exceed the design capacity of his facilities.
- c. The discharger's intended schedule for studies, design, and other steps needed to provide additional capacity for his waste treatment and/or disposal facilities before the waste flow rate equals the capacity of present units. (Reference: Sections 13260, 13267(b) and 13268, California Water Code).

C. Definitions:

1. The daily discharge rate is obtained from the following calculation for any calendar day:

$$\text{Daily discharge rate (lbs/day)} = \frac{8.34}{N} \sum_{i=1}^N Q_i C_i$$

$$\text{Daily discharge rate (kg/day)} = \frac{3.78}{N} \sum_{i=1}^N Q_i C_i$$

in which N is the number of samples analyzed in any calendar day. Q_i and C_i are the flow rate (MGD) and the constituent concentration (mg/l) respectively, which are associated with each of the N grab samples which may be taken in any calendar day. If a composite sample is taken, C_i is the concentration measured in the composite sample and Q_i is the average flow rate occurring during the period over which samples are composited.

2. The "30-day, or 7-day, average" discharge is the total discharge by weight during a 30, or 7, consecutive calendar day period, respectively, divided by the number of days in the period that the facility was discharging. Where less than daily sampling is required by this permit, the 30-day, or 7-day, average discharge shall be determined by the summation of all the measured discharges by weight divided by the number of days during the 30, or 7, consecutive calendar day period when the measurements were made.

If fewer than four measurements are made during a 30-day period or fewer than three during a 7-day period, then compliance or non-compliance with the 30, or 7, day average discharge limitation shall not be determined.

CALIFORNIA REGIONAL WATER QUALITY CONTROL BOARD
SAN FRANCISCO BAY REGION

SELF-MONITORING PROGRAM
FOR

Sonoma Creek Cellars

Schellville, Sonoma County

ORDER NO. 78-38

CONSISTS OF

PART A

AND

PART B

PART B

DESCRIPTION OF SAMPLING STATIONS AND SCHEDULE OF SAMPLING ANALYSES AND OBSERVATIONS

Ground water sampling will begin 60 days before the waste discharge commences, but other sampling and observations will begin at that time.

I. Ground Water

a. Waste 1

<u>Station</u>	<u>Description</u>
Mound Influent G-1 thru G-4	Effluent discharged to mound system. Ground water monitoring wells and devices are to be installed as part of the mound installation. The well depths should be designed to determine ground water levels. The location of these stations shall be at approximately the midpoints of the sides of the mound, no more than ten feet from the mound fill edge. (A sketch showing the location of these stations will accompany each report.)

<u>Station</u>	<u>Type of Sampling and Frequency of Analysis</u>	<u>Analyses</u>	<u>Unit</u>
Mound Influent G-1 thru G-4	Daily	Flow	gallons/day
	Grab sample (1) monthly throughout the year	Total coliform	MPN/100 ml
		Fecal Coliform	MPN/100 ml
	Grab sample (1) quarterly throughout the year.	NH ₃ -N	mg/l
		Nitrate-N	mg/l
		Nitrite-N	mg/l
		MBAS	mg/l

b. Waste 2

<u>Station</u>	<u>Description</u>
G-5	Ground water monitoring well located at approximately the midpoint of the east side of the oxidation pond within 20 feet of the pond. The depth shall be designed to determine the ground water level.
G-6	Ground water monitoring well located at approximately the midpoint of the south side of the oxidation pond within 20 feet of the pond. The depth shall be designed to determine the ground water level. (A sketch showing the location of these stations will accompany each report.)

<u>Station</u>	<u>Type of Sampling & Frequency of Analysis</u>	<u>Analyses</u>	<u>Unit</u>
G-5 thru G-6	Grab sample (1) quarterly throughout the year.	COD Nitrate- N Specific Conductance pH Fecal Coliform Total Coliform	mg/l mg/l Mmhos/cm Unit MPN/100 ml MPN/100 ml

NOTE: (1) The ground water should be pumped out for at least two minutes prior to taking grab sample for analyses.

II. Pond Observations

<u>Station</u>	<u>Description</u>
P-1 thru P-2	Located near the edge of the oxidation-settling pond at the approximate midpoint of the far ends of the pond.

<u>Station</u>	<u>Description</u>	<u>Analyses</u>	<u>Unit</u>
P-1 thru P-2	Grab sample monthly throughout the year.	Dissolved Oxygen Dissolved Sulfides pH	mg/l mg/l units
	Grab sample quarterly throughout the year.	COD Nitrate-N Specific Conductance	units mg/l Mmhos/cm

III. Land Observations

a. Waste 1

<u>Station</u>	<u>Description</u>
S-1 thru S-n	A point at which surfacing wastewater is apparent in the septic tank leach field. (A sketch shall be submitted with each report showing the location of each station.)

<u>Station</u>	<u>Type of Sample and Frequency</u>	<u>Observations</u>
All 'S' Stations	Observations, (2) monthly throughout the year.	Odor and surfacing wastewater

NOTE: (2) If surfacing water which may be wastewater is observed, sample for fecal and total coliform and repeat sampling and increase observations to weekly until source of water is determined or wastewater surfacing is corrected.

b. Waste 2

<u>Station</u>	<u>Description</u>
PP-1 thru PP-2	Located along the periphery of the winery waste oxidation settling pond at the approximate midpoint of the far ends of the pond.

<u>Station</u>	<u>Type of Sample and Frequency</u>	<u>Observations</u>
All 'PP' Stations	Observation every other week during the months of August to November, and monthly the rest of the year.	All applicable standard observations

I, Fred H. Dierker, Executive Officer, hereby certify that the foregoing Self-Monitoring Program:

1. Has been developed in accordance with the procedure set forth in this Regional Board's Resolution No. 73-16 in order to obtain data and document compliance with waste discharge requirements established in the Regional Board Order No. 78-38.
2. Has been ordered by the Executive Officer on June 20, 1978 and shall become effective immediately. Ground water sampling will begin 60 days before the discharge of waste commences and other sampling and observations will begin at that time.
3. May be reviewed at anytime subsequent to the effective date upon written notice from the Executive Officer or request from the discharger and revision will be ordered by the Executive Officer.

FRED H. DIERKER
Executive Officer